AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (currently amended): A process for the fluid catalytic cracking of mixed feedstocks of hydrocarbons from different sources, in a riser reactor and in the presence of a zeolitic catalyst, under cracking conditions for producing light products such as LPG, said mixed feedstocks comprising feeds A and B, with feed B being more refractory to cracking, wherein said process comprises simultaneous segregated injections of feeds A and B, in distinct riser locations, and includes the steps of:

a) injecting feed A at a location at the bottom of the riser reactor, which sets the base of the riser reactive section, with a temperature rise ranging from 10 to 50°C; and

b) injecting feed B, at an amount of from 5 to 50 wt% based on the total mixed feedstock, downstream, after maximum LPG production from feed A, at one or more riser locations between 10% and 80% of the riser reactive section;

wherein the injection conditions in a high dispersion degree of feed B comprise:

dispersion steam ranging from 5 to 20%; and

a temperature equal to or higher than the injection temperature of feed A;

wherein the catalyst to oil ratio is maintained during the cracking of feeds A and B, and

the light products resulting from the cracking process are recovered in a higher amount than would be obtained if feed B was injected in the base of the riser reactive section.

2. (original): A process according to claim 1, wherein feed A is a heavy distillation gasoil (HVGO).

3. (original): A process according to claim 1, wherein feed B is produced by a thermal or by a physical separation process.

4. (original): A process according to claim 3, wherein feed B is produced by a pyrolysis, delayed coking and shale oil retorting process.

5-7. (canceled).

8. (previously presented): A process according to claim 1, wherein the injection riser location of feed B is between 25% and 50% of the riser reactive section.

9-19. (canceled).

20. (original): A process according to claim 1, wherein the temperature rise in the mixing region between feed A and the regenerated catalyst is of from 10°C to 50°C, provided by the injection of feed B in a riser location downstream of the injection location of feed A, and is in the range of from 520°C to 650°C.

21. (canceled).

22. (original): A process according to claim 1, wherein the riser outlet reaction temperature is in the range of from 520°C to 590°C.

23-26. (canceled).

27. (original): A process according to claim 1, wherein the flow of the reactive catalyst to oil mixture is upwards.

28. (original): A process according to claim 1, wherein the flow of the reactive catalyst to oil mixture is downwards.

29-30. (canceled).

31. (original): A process according to claim 1, wherein the catalyst comprises a Y zeolite.

32. (original): A process according to claim 1, wherein the catalyst comprises a ZSM-5 zeolite.

33. (original): A process according to claim 1, wherein the catalyst comprises a combination of Y and ZSM-5 zeolites in any amount.

34. (previously presented): A process according to claims 31, 32 or 33, wherein the zeolite catalysts comprise zeolites as additives.

35-36. (canceled).